

### **REMARKS**

Claims 1-2, 5 and 6 were pending in the application. Claims 1 has been amended. Claims 5 and 6 have been cancelled. Claims 1 and 2 therefore are pending and presented for review. Favorable reconsideration and allowance of this application is respectfully requested in light of the foregoing amendments and the remarks that follow.

#### **1. Rejection of Claims Under 35 U.S.C. § 103(a)**

Claims 1-2, 5 and 6 were previously rejected under 35 USC 103(a) as being obvious over Yamada U.S. Patent No. 3,856,285 in view of Watanabe U.S. Patent No. 6,193,225 and/or Komura JP 9-21440 or U.S. Pat. No. 5,622,358. Applicants respectfully traverse this rejection because, *inter alia*, there is no teaching or suggestion to combine the Yamada patent with the Watanabe or Komura patents to produce a spring of the claimed type. Furthermore, even if the references were combined, the invention would not result. Therefore, reconsideration is in order and is respectfully requested.

##### **a. Recapitulation of the Invention**<sup>1</sup>

The invention relates to a spring device that includes a coil spring case formed of right, left, back and front side plates, a spring receiving plate, a coil spring having *a linear spring property*, and a spring urging member for urging the coil spring into the coil spring case. Preferably, the distance between the right and left side plates of the spring case are set slightly

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<sup>1</sup> This Section 1a is intended to provide the Examiner with some background information on the state of the art and applicants' contribution to it. It is *not* intended to distinguish specific claims from the prior art. That task is performed in Section 1b below.

larger than an outer diameter of the coil spring. The distance between the back and front side plates of the spring case is set about 1.5 to 2 larger than the outer diameter of the coil spring and the coil spring is brought into contact with the back and front side plates of the coil spring case at a curved portions thereof. The length of the spring case is set smaller than a free length of the coil spring, such that the coil spring is deformed and a *non-linear spring property* is obtained when the coil spring is urged by the spring urging member. Thus, as a result of the unique configuration of the spring case, a non-linear spring property can be obtained from a linear spring.

**b. Traversal of Rejections Under 35 U.S.C. § 103(a)**

Claim 1 recites a spring device that includes a coil spring case formed of right, left, back and front side plates, a spring receiving plate, a coil spring, and a spring urging member inserted into the coil spring case through an opening of the coil spring case for compressing the coil spring in the coil spring case so that the coil spring is deformed along a curve so as to have a non-linear spring property. Claim 1 further states that the distance between the right and left side plates of the spring case is larger than an outer diameter of the coil spring, and the distance between the back and front side plates of the spring case is set 1.5 to 2 times larger than the diameter of the coil spring. Claim 1 also recites that the coil spring is brought into contact with the back and front side plates of the coil spring case at a curved portions thereof.

As previously noted and acknowledged by the Examiner, the Yamada patent does not disclose the spring device as recited in amended claim 1. The Examiner alleges that “Yamada shows a device similar to that of the elected embodiment.” Applicants respectfully disagree. Yamada merely shows a shock absorbing device for an automobile that has a casing. Yamada does not disclose or teach that the spring 11, 35 or 45 is compressed within a spring case having a distance between the right and left side plates being set larger than an outer diameter of the coil spring, a distance between the back and front side plates of the spring case being set 1.5 to 2 times larger than the outer diameter of the coil spring, and a coil spring brought into contact with the back and front side plates of the coil spring case at a curved portion. Nor does it suggest a coil spring disposed in a case so as to produce a *non-linear* spring property as claimed. Yamada instead merely discloses a linear spring within a casing. There is no disclosure of achieving a non-linear spring property by deforming a coil spring about a curve as claimed.

The Examiner takes official notice of the fact that springs with linear and non-linear properties are well-known in the art and suggests that Watanabe and Komura et al. provides a general teaching of this idea. Applicants concede that springs with linear and non-linear properties are well-known in the art, however, the Examiner is using Official Notice for something that is improper. Specifically, while springs with linear and non-linear properties are known in the art, the Examiner’s suggestion that the claimed dimensional relationship of the spring case to the spring is not proper. In addition, even though non-linear springs are known *per se*, the Examiner has not pointed to any motivation in the references for modifying the spring of

the Watanabe and Komura et al. references. While Applicant concedes that springs with linear and non-linear properties are known in the art, the Examiner's argument that the claimed dimensional relationship of the spring case to the spring is obvious is simply not proper.

Official Notice is to be used for "facts outside of the record which are capable of instant and unquestionable demonstration as being 'well-known' in the art." MPEP § 2144.03. As noted, while linear and non-linear springs may be known, the substitution of one for the other is not a fact "capable of instant and unquestionable demonstration as being 'well-known' in the art." *Id.* Furthermore, "the facts so noticed serve to 'fill the gaps' which might exist in the evidentiary showing and should not comprise the principal evidence on which the rejection is based." *Id.*, citing *In re Ahlert*, 165 USPQ 418 (CCPA 1970). The suggestion or motivation to substitute the springs of Watanabe and Komura et al., like other facts constituting the state of the art, is open to the subject of rational disagreement of reasonable men and is not amenable to the taking of official notice. *Id.* In the present case, the official notice taken by the Examiner is not only the "principal evidence" on which the rejection is based, it is the **only** evidence. It cannot support a finding of equivalency or an ultimate conclusion of obviousness.

For the foregoing reason, applicants hereby formally challenge the Examiner's Official Notice. As support for this challenge, applicants cite their own disclosure, which asserts that the present application differs from the prior art. These statements must be given proper weight

when evaluating non-obviousness because, *inter alia*, they were made under declaration. *See In re Soni*, 34 USPQ2d 1684 (Fed. Cir.1995). In response to this challenge, the Examiner is requested to either 1) submit documentary evidence in support of his position suggesting modifying the linear spring of Yamada with the Watanabe or Komura references or 2) submit a declaration averring that he has personally seen disclosures teaching the interchangeability of linear and non-linear springs.

Furthermore, neither Watanabe or Komura et al. remedy Yamada's failure to disclose a spring device having the claimed casing and a coil spring that exhibits non-linear spring properties. Watanabe merely discloses that non-linear spring properties can be achieved in a coil spring by forming the coil spring to have three unique cross sections. Note in this regard that the embodiment of the coil spring shown in Fig. 4 of Watanabe is merely the prior art coil spring identified in the present application in Fig. 3 and discussed on page 3 of the present application. Likewise, Komura JP 9-21440 merely discloses the use of three distinct linear coil springs A, B, and C. (See Fig. 1) No non-linear spring properties are obtained.

Neither Watanabe nor Komura et al. suggest that a non-linear coil spring can be formed by placing a linear coil spring within a case having the claimed proportions. Nor, as noted above, is there any suggestion to place Watanabe's or Komura et al.'s spring in Yamada's housing. Watanabe's spring is designed for use as suspension spring, which mounts between the automobile's suspension and frame as generally seen in Figure 8 of Watanabe. A shock absorber is used *in addition to* a suspension spring to form a classic mass-spring-damper system. Hence,

at most, Watanabe would have suggested using its suspension spring in combination with Yamada's spring-biased shock absorber on the same vehicle. As noted above, there is no disclosure of achieving non-linear spring properties in Komura et al.

In addition, even if one were to replace Yamada's coil spring with either Watanabe's non-linear spring or Komura et al.'s linear spring, there is no suggestion of setting the claimed proportional relationships between the spring and the case. Moreover, since Watanabe's spring is *already* non-linear, one of ordinary skill in the art would not have been motivated to take measures with respect to that spring that would render another, linear, spring non-linear. To conclude otherwise would be to pick and choose amongst the teachings of the prior art, using applicant's own disclosure as a template or mosaic to latch on to those teachings that support the Examiner's position while ignoring those that do not. The Federal Circuit has held that a rejection based on obviousness cannot be predicated upon such an approach:

It is impossible with the framework of Section 103 to pick and choose from any one reference only so much of it as will support a given position, to the exclusion of the other parts necessary to the full appreciation of what such reference fairly suggests to one of ordinary skill in the art.

*In re Hedges*, 228 USPQ 685, 687 (Fed. Cir. 1986), citing *In re Wesslau*, 3147 USPQ 391, 393 (CCPA) 1965; *see also* MPEP § 2143.

For at least these reasons, the references alone or in combination fail to teach or suggest the spring device of claim 1.

Dependent claims 2 is believed to be in condition for allowance for incorporating by reference the limitations of claim 1 and for defining additional features of the invention, which, when considered in combination with those of claim 1 are neither disclosed nor suggested by the prior art relied upon in the rejection.

### **Conclusion**

For the forgoing reasons, claims 1 and 2 are believed to be in *prima facie* condition for allowance. Should the Examiner have any remaining questions that the attending to of which would expedite such action, he is invited to contact the undersigned at the telephone number appearing below.

Response to Advisory Action mailed February 3, 2006  
Patent Application Serial No. 10/666,047 to Ozawa et al.  
Art Unit: 3683  
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A check in the amount of \$1810 is included with this communication for a three-month extension of time which applicant hereby requests and for a request for continued examination (RCE). Nevertheless, should the Examiner consider any other fees to be payable in conjunction with this or any future communication, the Director is authorized to direct payment of such fees, or credit any overpayment to Deposit Account No. 50-1170.

Respectfully submitted,



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